

Abstract

The invention relates a diagnostic circuit for a treble
loudspeaker of a loudspeaker combination of a low-frequency
5 output stage, and a method for diagnosing the functionality
of the treble loudspeaker.

In order to determine the functionality of the treble
loudspeaker with relatively little complexity and high
10 reliability, a diagnostic circuit is proposed that
comprises:

an HF signal-generating device (2) for outputting an HF
voltage signal (s2);

at least one terminal (A1, A2) for a loudspeaker combination
15 (4);

a measuring resistor (R2) that, upon connection of the
loudspeaker combination (4) to the terminal (A1), forms
therewith a voltage divider circuit (R2, 4);

a measurement device (10, 11, 12) for measuring a complex
20 measured voltage (UA1) dropping in the voltage divider
circuit (R2, 4) and for ascertaining a condition of the
treble loudspeaker (LS2) of the loudspeaker combination (4).

(Figure 1)